

### REMARKS

Claims 1-7 are pending and under consideration in the instant application. Claims 8-11, 21-24, 28, 29 and 31-34 are withdrawn from consideration. Claim 5 is allowed. Claims 1-4, 6 and 7 have been rejected. Claims 1, 2, 8-11, 21-24, 28, 29 and 31-34 have been cancelled. Claims 3, 4 and 6 have been amended. These amendments do not introduce any new subject matter, and support for them can be found in the specification. After entry of this amendment, Claims 3-7 will remain pending.

#### Specification

The Examiner has objected to the title of the invention as allegedly failing to be descriptive. Without conceding the correctness of the Examiner's objection, but to advance the prosecution of the instant application, Applicants have amended the title of the invention to "Substituted 2-Phenylthieno[2,3-d]pyrimidin-4-ones as Mitotic Kinesin Inhibitors." Accordingly, Applicants respectfully request that the Examiner's objection to the specification be withdrawn.

#### Rejection of Claims 1-4, 6 and 7 under 35 USC §112, second paragraph

The Examiner has rejected Claims 1-4, 6 and 7 under 35 U.S.C §112, second paragraph for allegedly failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

The Examiner alleges that there is insufficient antecedent basis for the limitation "-CH=CHO- and -CH=CHN-" in the definitions of R<sup>4a</sup> and R<sup>4b</sup> in Claim 3. Without conceding the correctness of the Examiner's rejection, but to advance the prosecution of the instant invention, Applicants have deleted the limitations "-CH=CHO- and -CH=CHN-" from the definitions of R<sup>4a</sup> and R<sup>4b</sup> in Claim 3.

The Examiner further alleges that there is insufficient antecedent basis for the limitation "R<sup>5</sup>" in the definition of R<sup>6</sup> and R<sup>7</sup> in Claims 3 and 4. Without conceding the correctness of the Examiner's rejection, but to advance the prosecution of the instant invention, Applicants have deleted "R<sup>5</sup>" from Claims 3 and 4.

The Examiner alleges that there is insufficient antecedent basis for the limitation "(C<sub>1</sub>-C<sub>6</sub>)alkyl-NR<sup>6</sup>R<sup>7</sup>" in the definition of R<sup>2</sup> in Claim 4. Without conceding the correctness of the Examiner's rejection, but to advance the prosecution of the instant invention, Applicants have amended "(C<sub>1</sub>-C<sub>6</sub>)alkyl-NR<sup>6</sup>R<sup>7</sup>" to read "(C<sub>1</sub>-C<sub>6</sub>)alkylene-NR<sup>6</sup>R<sup>7</sup>" in Claim 4.

In light of the amendments made to Claims 3 and 4, Applicants respectfully request the rejection of Claims 1-4, 6 and 7 under 35 U.S.C. §112, second paragraph, be withdrawn.

Rejection of Claims 1-4, 6 and 7 under 35 USC §112, first paragraph

The Examiner has rejected Claims 1-4, 6 and 7 under 35 U.S.C §112, first paragraph as allegedly failing to comply with the enablement requirement.

Applicants respectfully traverse this rejection. Applicants have cancelled Claims 1 and 2, and amended Claims 3 and 4. Applicants believe that the scope of Claims 3 – 7 is fully enabled. In the instant application, Applicants have provided two generic schemes and a full synthetic example to enable the invention.

In light of these amendments and cancellations, Applicants respectfully request the rejection of Claims 1-4, 6 and 7 under 35 U.S.C. §112, first paragraph, be withdrawn.

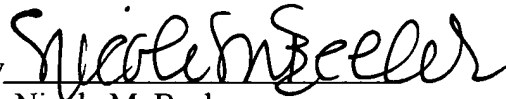
Rejection of Claim 1 under 35 U.S.C. §102(b)

The Examiner has rejected Claim 1 under 35 U.S.C. §102(b) as allegedly being anticipated by Dugar et al. (US 7223766), El-Baih et al. (Journal of Saudi Chemical Society 2000), Piazza et al. (US 6200980), Pamukca et al. (US 5948911), Walter et al. (US 6277858), Oota et al. (JP 08143571), Dumaitre et al (J. Med Chem. 1996), Shishoo et al. (Indian J. Chem. 1989), Sauter et al. (Monatshefte fuer Chemie 1976) and Reid et al. (Justus Liebigs Annalen der Chemie 1968).

Applicants have cancelled Claim1. In light of this cancellation, Applicants respectfully request that the rejection of Claim 1 under 35 U.S.C. §102(b) be withdrawn.

If a telephonic communication with the Applicants' representative will advance the prosecution of the instant application, please telephone the representative indicated below. Applicants believe no additional fees are due but the Commissioner is authorized to charge any fees required in connection with this response to Merck Deposit Account No. 13-2755.

Respectfully submitted,

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